carly.rich@sobi.com

Impact of Thrombopoietin Receptor Agonist Treatment and Adherence in Patients with Primary Chronic Immune Thrombocytopenia: Results of an International Cross-sectional Survey

J. J. Zwaginga,[1] S. Nagalla,[2] M. Linden,[3] M. Lindberg,[4] C. Kruse,[5] M. Morgan,[6] D. Decise,[7] M. Putnik,[7] C. Rich[7]

[1]Leiden University Medical Center, Leiden, The Netherlands; [2]Miami Cancer Institute, Miami, FL, USA; [3]ITP-foreningen, 1634 Gamle Fredrikstad, Norway; [4]ITP Suomi, Ylivieska, Finland; [5]Platelet Disorder Support Association, Cleveland, OH, USA; [6]ITP Support Association, Bolnhurst, UK; [7]Sobi, Stockholm, Sweden

CONCLUSIONS

- This real-world international survey showed that people living with ITP may experience a negative impact on their daily activities and mental health from their condition
- Treatment with some TPO-RAs may also impair specific activities, likely influenced by administration route and dietary restriction

INTRODUCTION

- The symptoms of immune thrombocytopenia (ITP) may substantially impair patient health-related quality of life (HRQoL), including energy/fatigue, physical functioning, daily activities and mental health[1–3]
- Treatment for people with primary ITP aims to minimise the risk of severe bleeding and optimise HRQoL[4]
- Following first-line oral corticosteroids or intravenous immunoglobulin, three thrombopoietin receptor agonists (TPO-RAs) are currently available:[4] romiplostim (ROMI), eltrombopag (ELT) and avatrombopag (AVA), which have different administration modalities
- Studies of patients' perspectives on daily life relating to the administration and adherence of these treatments are limited

OBJECTIVE

- To evaluate the understanding of, and adherence to TPO-RA treatment instructions by people with ITP, and to determine the impact of ITP and TPO-RAs on their daily lives

METHODS

- A cross-sectional, self-administered, online survey conducted from September 2023 to April 2024
- Eligible by people with ITP were aged ≥18 years, had a primary chronic ITP diagnosis and were prescribed a TPO-RA in the last 12 months and for ≥3 months
- Respondents were recruited voluntarily by patient organisations in 6 countries via direct mail, email, and/or online platforms

RESULTS

Baseline characteristics

- In total, 221 respondents completed the survey. Mean (standard deviation [SD]) age was 57.4 (15.5) years, most were female (69%) and mean (SD) time since ITP diagnosis to survey completion was 10.7 (10.6) years (**Table 1**)
- Respondents were from the Netherlands (n=77; 35%), the USA (n=72; 33%), the UK (n=53; 24%), Norway (n=11; 5%), Finland (n=7; 3%) and Germany (n=1; <1%)
- Respondents were currently (n=204)/most recently (n=17) treated with ELT (n=118; 53%), ROMI (n=65; 29%) or AVA (n=38; 17%)

Table 1. Baseline demographics and treatment status

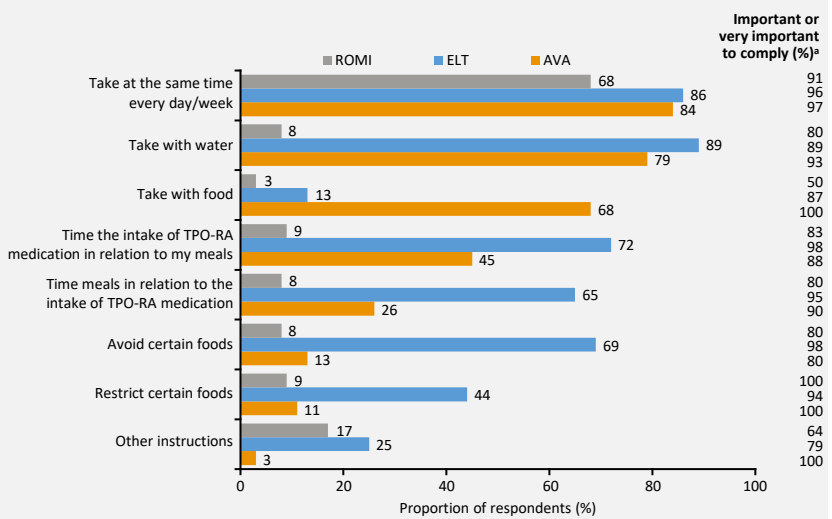
Characteristic	ROMI (n=65)	ELT (n=118)	AVA (n=38)	Total (N=221)
Age, years, mean (SD)	58.9 (14.7)	56.3 (15.7)	58.2 (16.6)	57.4 (15.5)
Female, n (%)	45 (69.2)	81 (68.6)[a]	27 (71.1)	153 (69.2)[a]
Time since ITP diagnosis, years, mean (SD)	10.4 (10.4)	10.6 (10.8)	11.4 (11.0)	10.7 (10.6)
Currently using the indicated TPO-RA, n (%)	61 (93.8)	109 (92.4)	34 (89.5)	204 (92.3)
Recently used the indicated TPO-RA, n (%)	4 (6.2)	9 (7.6)	4 (10.5)	17 (7.7)

[a]Excludes 1 (0.5%) patient who preferred not to answer
AVA, avatrombopag; ELT, eltrombopag; ITP, immune thrombocytopenia; ROMI, romiplostim; SD, standard deviation; TPO-RA, thrombopoietin receptor agonist

TPO-RA administration: instructions, education and adherence

- Most respondents (95%) received instructions on how to take their TPO-RA and over one-third (37%) were given ≥5 specific instructions (ELT 58%; AVA 24%; ROMI 9%). Taking treatment at the same time each day/week was the most common instruction (ELT 86%; AVA 84%; ROMI 68%) (**Figure 1**)
- ELT-treated respondents were given the most instructions about food: timing of medication relative to meals (72%), meals relative to medication (65%), and the restriction (44%) or avoidance (69%) of certain foods (**Figure 1**)
- Nearly one-third (32%) of ELT-treated respondents ate when/what they wanted at times despite these instructions, and 64% of this treatment group would prefer to have a TPO-RA with no food/drink restrictions

Figure 1. Specific instructions respondents reported for taking TPO-RA medication



N=221 (ROMI, n=65; ELT, n=118; AVA, n=38)
[a]Proportion of respondents per treatment who found it important or very important to follow each instruction category
AVA, avatrombopag; ELT, eltrombopag; ROMI, romiplostim; TPO-RA, thrombopoietin receptor agonist

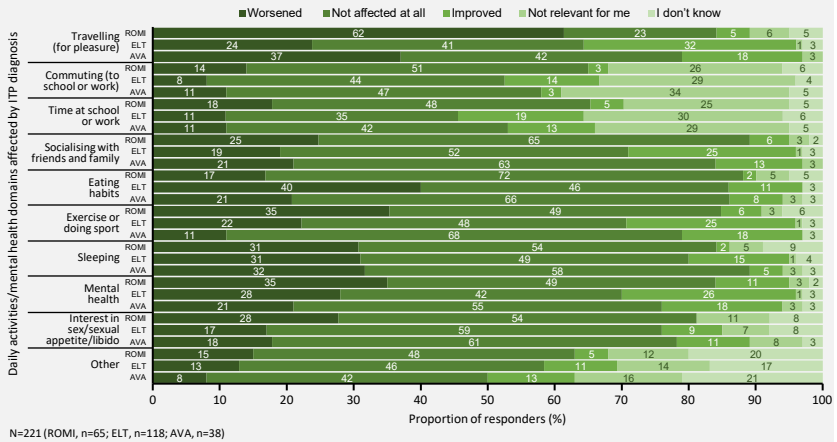
Impact of ITP on daily life/mental health

- Compared to before ITP diagnosis, living with ITP was reported to negatively impact ≥1 daily activity or mental health in 89% of respondents, most commonly travelling (for pleasure [69%]), mental health (66%) and exercise/sport (62%); eating habits (32%) and commuting (to school or work [29%]) appeared to be least affected by ITP diagnosis

Impact of TPO-RA medication on daily life/mental health

- Most respondents reported either no impact or an improvement in ≥1 daily activity or mental health after TPO-RA treatment initiation (**Figure 2**). However, all individual domains were reported to be negatively impacted to some extent by treatment with TPO-RAs; travelling (for pleasure) was most impacted (ROMI 62%, AVA 37%, ELT 24%), while eating habits, sleeping, exercise/sport and mental health were also impacted in ≥30% of respondents

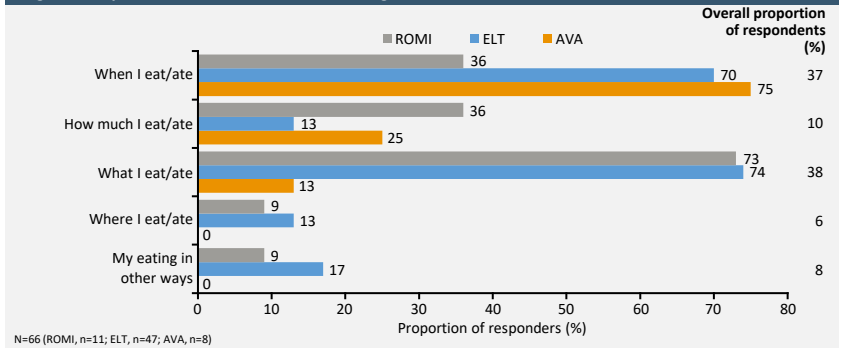
Figure 2. Daily activity/mental health domains affected by ≥1 TPO-RA treatment



N=221 (ROMI, n=65; ELT, n=118; AVA, n=38)
AVA, avatrombopag; ELT, eltrombopag; ROMI, romiplostim; TPO-RA, thrombopoietin receptor agonist

- The majority of respondents who had eating habits affected to some extent by TPO-RAs were receiving ELT (n=47/66), with the greatest impact on when (70%) and what (74%) they eat/ate (**Figure 3**)

Figure 3. Impact of TPO-RA medication on eating habits



N=66 (ROMI, n=11; ELT, n=47; AVA, n=8)
AVA, avatrombopag; ELT, eltrombopag; ROMI, romiplostim; TPO-RA, thrombopoietin receptor agonist

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